

## **REMARKS/ARGUMENTS**

Claims 2-20 are currently pending in the present patent application, with claim 1 having been cancelled through the above claim amendments.

In the Office Action mailed on September 22, 2008, the Examiner rejects claims 1-15 under 35 USC § 102(b) as being anticipated by US Patent No. 5,638,164 to Landau et al. (hereinafter "Landau"). The Examiner rejects claims 16-20 under 35 USC § 103(a) as being unpatentable over Landau.

Claim 2 has been rewritten in independent form to recite a method for transitioning a target from a missile warning system to a fine tracking system in a directional countermeasures system. The method includes capturing at least one lower-resolution image within a field of view of the missile warning system, identifying a threat from the captured lower-resolution image or images, identifying features surrounding the threat from a captured lower-resolution image utilized in identifying the threat, capturing a higher-resolution image within a field of view of the fine tracking system, and identifying a location of a threat within this captured higher-resolution image as a function of the identified features. The operations of capturing at least one lower-resolution image and capturing a higher-resolution image include sensing infrared radiation emitted by the threat.

Note that claim 2 has been amended to clarify that in the recited method of claim 2 the sensing of infrared radiation is radiation emitted from or "by" the threat being detected and is not infrared radiation reflected from the threat in response to incident infrared radiation. The Landau patent is directed to a laser imaging system that utilizes a laser scanner to scan a scene in various modes of operation. Thus, in Landau even if an infrared laser is utilized, the operation of the system is not based upon capturing infrared radiation emitted by the threat but instead is based upon capturing radiation reflected from the threat responsive to incident radiation applied to the threat. See column 2, lines 27-34 and column 3, lines and 1-28.

For at least these reasons, the combination of elements recited in claim 2 is not anticipated by the Landau patent and is therefore allowable. Dependent claim 3 is allowable for at least the same reasons as claim 2.

Claim 4 recites the method of claim 2 wherein identifying features surrounding the threat from a captured lower-resolution image utilized in identifying the threat includes registering the features to thereby define the position of each of the features relative to the threat. As described in paragraphs 17 and 26, for example, a captured subimage around and identified threat 206 is analyzed to determine features that may be associated or “register” to the threat. See Figure 2. After these features have been determined, these features and the subpixel location of the threat are utilized to register where the threat is with respect to the determined features. Registering the features corresponds to identifying or defining where the threat is in relation to the identified features.

The Landau patent neither discloses nor suggests registering features as recited in claim 4. The portions of Landau pointed to by the Examiner on page 2 of the Office Action simply do not disclose or suggest registering features of a threat. A general target-characterizing criterion is discussed in column 2, lines 27-34. While such a general target-characterizing criterion may correspond to identifying features of a target, it does not correspond to registering features of a threat as recited in claim 4.

For at least these additional reasons, the combination of elements recited in claim 4 is allowable.

Claim 5 recites the method of claim 4 wherein the method further comprises determining a contrast between the threat and a background portion of the lower-resolution image, and when the contrast is greater than a threshold level, identifying a location of a threat within the captured higher-resolution image without the use of the identified features. The Landau patent neither discloses nor suggests identifying a location of a threat within a captured higher-resolution image without the use of identified features when a determined contrast is greater than a threshold level. In

fact, as mentioned in column 6, lines 63-67 of Landau, the system is described as operating in a segmentation/correlation mode “where a region of interest is scanned at a higher resolution and suspect targets are classified based on a comparison with at least one of a plurality of pre-stored target signatures.” There is no disclosure or suggestion in Landau of determining a contrast and then when determined contrast is greater than a threshold level identifying the location of a threat without using previously identified features of the threat.

For at least these additional reasons, the combination of elements recited in claim 5 is allowable.

Dependent claim 6 recites the method of claim 2 wherein the method further includes performing countermeasures on the threat identified within the captured higher-resolution image. The undersigned was not able to find and the Examiner has pointed to no sections of the Landau patent dealing with countermeasures. A countermeasure is a device or some action taken to thwart a sensing mechanism of a threat, such as transmitting a signal to “jam” guidance circuitry in a missile that is guiding a missile towards a desired target. Instead, Landau only contemplates providing a suitable output message once a threat has been identified or determining a critical game point once a threat has been identified. See column 8, lines 59-65. Furthermore, Landau states that when “the critical aim point is determined, aiming instructions are provided to weaponry or an operator, preferably through grayscale range and reflectance images of the scanned critical and point region on [a] display.” See column 8, lines 66-67 and column 9, lines 1-2. Such actions are not countermeasures.

For at least these additional reasons, the combination of elements recited in claim 6 is allowable.

Dependent claim 7 recites the method of claim 6 wherein performing countermeasures includes illuminating the threat with modulated infrared radiation. As just discussed above with regard to claim 6, the Landau patent does not disclose

countermeasures that include illuminating the threat with modulated infrared radiation.

For these additional reasons, the combination of elements recited in claim 7 is allowable. Dependent claim 8 is allowable for at least the same reasons as claim 2 and due to the additional elements recited in this claim.

Independent claim 9 recites, in part, identifying features surrounding a threat and registering these features with the threat. As discussed above with regard to claim 4, the Landau patent neither discloses nor suggests such a registering operation. Accordingly, the combination of elements recited in independent claim 9 is allowable. Dependent claims 10-15 are allowable for at least the same reasons as claim 9 and due to the additional limitations added by each of these dependent claims.

Independent claim 16 recites, in part, a fine tracking subsystem operable to capture higher-resolution images within a narrow field of view and to track and perform countermeasures on a threat identified in the higher-resolution images. As discussed above with regard to claim 6, the Landau patent neither discloses nor suggests performing such countermeasures on a threat. For at least this reason, the combination of elements recited in claim 16 is allowable. Dependent claims 17-20 are allowable for at least the same reasons as claim 16 and due to the additional limitations added by each of these dependent claims.

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The present patent application is in condition for allowance. Favorable consideration and a Notice of Allowance are respectfully requested. **Should the Examiner have any further questions about the application, Applicants respectfully request the Examiner to contact the undersigned attorney at (425) 455-5575 to arrange for a telephone interview to discuss the outstanding issues.** If the need for any fee in addition to any fee paid with this response is found, for any reason or at any point during the prosecution of this application, kindly consider this a petition therefore and charge any necessary fees to Deposit Account 07-1897.

Respectfully submitted,

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